assistant, tablet to name a few. The client computer #02 includes memory such as random access memory (RAM), read-only memory (ROM), mass storage device, or any combination thereof. The memory functions as a computer usable storage medium, otherwise referred to as a computer readable storage medium, to store and/or access computer software and/or instructions.

The client computer **2002** also includes a communications interface, for example, a modem, a network interface (such as an Ethernet card), a communications port, a PCMCIA slot and card, wired or wireless systems, etc. The communications interface allows communication through transferred signals between the client computer **2002** and external devices including networks such as the Internet **2004** and cloud data center **2006**. Communication may be implemented using wireless or wired capability such as cable, fiber optics, a phone line, a cellular phone link, radio waves or other communication channels.

The client computer **2002** establishes communication with the Internet **2004**—specifically to one or more servers—to, in turn, establish communication with one or more cloud data centers **2006**. A cloud data center **2006** includes one or more networks **2010***a*, **2010***b*, **2010***c* managed through a cloud management system **2008**. Each network **2010***a*, **2010***b*, **2010***c* includes resource servers **2012***a*, **2012***b*, **2012***c*, respectively. Servers **2012***a*, **2012***b*, **2012***c* permit access to a collection of computing resources and components that can be invoked to instantiate a virtual machine, process, or other resource for a limited or defined duration. For example, one group of resource servers can host and serve an operating system or components thereof to deliver and instantiate a virtual machine. Another group of resource servers can accept requests to host computing cycles or processor time, to supply a defined level of processing power for a virtual machine. A further group of resource servers can host and serve applications to load on an instantiation of a virtual machine, such as an email client, a browser application, a messaging application, or other applications or software.

The cloud management system **2008** can comprise a dedicated or centralized server and/or other software, hardware, and network tools to communicate with one or more networks **2010***a*, **2010***b*, **2010***c*, such as the Internet or other public or private network, with all sets of resource servers **2012***a*, **2012***b*, **2012***c*. The cloud management system **2008** may be configured to query and identify the computing resources and components managed by the set of resource servers **2012***a*, **2012***b*, **2012***c* needed and available for use in the cloud data center **2006**. Specifically, the cloud management system **2008** may be configured to identify the hardware resources and components such as type and amount of processing power, type and amount of memory, type and amount of storage, type and amount of network bandwidth and the like, of the set of resource servers **2012***a*, **2012***b*, **2012***c* needed and available for use in the cloud data center **2006**. Likewise, the cloud management system **2008** can be configured to identify the software resources and components, such as type of Operating System (OS), application programs, and the like, of the set of resource servers **2012***a*, **2012***b*, **2012***c* needed and available for use in the cloud data center **2006**.

The present invention is also directed to computer products, otherwise referred to as computer program products, to provide software to the cloud computing system **2001**. Computer products store software on any computer useable medium, known now or in the future. Such software, when executed, may implement the methods according to certain embodiments of the invention. Examples of computer useable mediums include, but are not limited to, primary storage devices (e.g., any type of random access memory), secondary storage devices (e.g., hard drives, floppy disks, CD ROMS, ZIP disks, tapes, magnetic storage devices, optical storage devices, Micro-Electro-Mechanical Systems (MEMS), nanotechnological storage device, etc.), and communication mediums (e.g., wired and wireless communications networks, local area networks, wide area networks, intranets, etc.). It is to be appreciated that the embodiments described herein may be implemented using software, hardware, firmware, or combinations thereof.

The cloud computing system **2001** of FIG. **9**B is provided only for purposes of illustration and does not limit the invention to this specific embodiment. It is appreciated that a person skilled in the relevant art knows how to program and implement the invention using any computer system or network architecture.

What is claimed is:

1. A system for facilitating collection of biometric data comprising:

one or more spacing supports to which are rotatably connected a biometric source attachment and a lens plate;

said lens plate comprising a lens aperture, said lens plate rotatable such that said lens plate may be positioned adjacent to a mobile device with said lens aperture aligned over a camera lens of the mobile device;

said biometric source attachment rotatable such that said biometric source attachment is spaced from said lens plate by said spacing supports,

said biometric source attachment comprising a biometric source aperture formed by at least one bridge element and at least one support element, each bridge element positioned between two support elements and each bridge element including a face on which a human body part is firmly rested so that one or more distortion free images of the human body part exposed within the biometric source aperture is captured by operation of the camera lens of the mobile device and processed for the collection of the biometric data.

2. A system according to claim **1**, wherein said face of said biometric source attachment is sized and shaped to receive a portion of a human finger.

3. A system according to claim **1**, wherein said face of said biometric source attachment is sized and shaped to receive some or all the human body adjacent to an eye retina or another identifying facial characteristic.

4. A system for facilitating contactless collection of biometric data comprising:

a guidance system including an outer surface and an inner surface, the guidance system sized and shaped to be received on an exterior corner area of a mobile communication device;

said guidance system including an aperture sized and shaped to permit a camera of the mobile communication device to capture one or more images therethrough for processing and production of the biometric data;

said guidance system further including a guiding component rotatable between an erected position and a flush position, in the erected position said guiding component generally perpendicular to the outer surface, a biometric source aligned to a guiding surface of the guiding component in the erected position for the capture of the one or more images for processing and production of the biometric data.